

IN THE UNITED STATES DISTRICT COURT  
FOR THE DISTRICT OF DELAWARE

NCUBE CORPORATION,	:	
	:	
Plaintiff/ Counterclaim	:	
Defendant,	:	
	:	
v.	:	Civil Action No. 01-11-JJF
	:	
SEACHANGE INTERNATIONAL, INC.,	:	
	:	
Defendant/ Counterclaim	:	
Plaintiff.	:	

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**MEMORANDUM OPINION**

April 7, 2004  
Wilmington, Delaware

**Farnan, District Judge.**

Presently before the Court is a Motion for Judgment as a Matter of Law or Alternatively for a New Trial (D.I. 146-1, 146-2), filed by Defendant SeaChange International Inc. ("SeaChange") and a Motion for a Permanent Injunction and an Accounting (D.I. 138), a Motion for Enhanced Damages, Motions For Attorneys' Fees, Costs, Prejudgment and Post-Judgment Interest (D.I. 145, 147-1, 147-2) and a Motion to Strike and Disregard the Untimely Declarations of Messrs. Gerovac, Nixon and Ms. Boyd as Outside the Record Evidence and Submitted for an Improper Purpose (D.I. 170) all filed by Plaintiff nCUBE, Corporation ("nCUBE").

For the reasons discussed in this Memorandum Opinion, the Court granted in part and denied in part SeaChange's Motion for Judgment as a Matter of Law (D.I. 146-1), denied SeaChange's Motion for a New Trial (D.I. 146-2), granted Plaintiffs' motions for Enhanced Damages, Attorneys' Fees, Costs, Prejudgment and Post-Judgment Interest (D.I. 145, 147-1, D.I. 147-2) and granted in part and denied in part Plaintiff's Motion to Strike and Disregard the Untimely Declarations of Messrs. Gerovac, Nixon and Ms. Boyd as outside the Record Evidence and submitted for an improper purpose (D.I. 170).

**BACKGROUND**

**I. Procedural Background**

On January 8, 2001, nCUBE filed this lawsuit alleging that

SeaChange willfully infringed U.S. Patent No. 5,805,804 ("the '804 Patent") entitled "Method and Apparatus for Scalable, High Bandwidth Storage, Retrieval and Transportation of Multimedia Data on a Network." Specifically, nCUBE contends that SeaChange's Interactive Television System ("ITV system") infringes claims 1-4, 6, 7, 9, 10, 12 and 14 ("the asserted claims") of the '804 Patent.

On May 29, 2002, a jury returned a verdict finding that:

- 1) SeaChange literally infringed claims 1-4, 6, 7, 9, 10, 12 and 14 of the '804 Patent;
- 2) SeaChange also infringed the above claims under the doctrine of equivalents;
- 3) SeaChange's infringement of the '804 Patent was willful;
- 4) SeaChange did not establish by clear and convincing evidence that the '804 Patent was invalid due to anticipation;
- 5) SeaChange did not establish by clear and convincing evidence that the '804 Patent was invalid due to obviousness;
- 6) the infringing sales by SeaChange were \$29,083,269, subject to a reasonable royalty rate of 7%, and therefore, awarded a total of \$2,035,829 as damages (D.I. 128).

The Court entered a judgment, per the jury verdict in favor of nCUBE. (D.I. 142, 179).

## **II. Technical Background**

The '804 Patent is directed to a media server capable of delivering multimedia information over any network configuration. Specifically, the '804 Patent teaches a media server, capable of

transporting multimedia information to a client, in real time, as requested, whose architecture is compatible with any network configuration or topology.

### **III. Sea Change's Motion for Judgment As a Matter of Law**

#### **A. Legal Standard**

To prevail on a motion for judgment as a matter of law following a jury trial, the moving party "must show that the jury's findings, presumed or express are not supported by substantial evidence or, if they were, that the legal conclusions implied [by] the jury's verdict cannot in law be supported by those findings.'" Pannu v. Iolab Corp., 155 F.3d 1344, 1348 (Fed. Cir. 1998) (quoting Perkin-Elmer Corp. v. Computervision Corp., 732 F.2d 888, 893 (Fed. Cir. 1984)). In assessing the sufficiency of the evidence, the Court must give the non-moving party, "as [the] verdict winner, the benefit of all logical inferences that could be drawn from the evidence presented, resolve all conflicts in the evidence in his favor, and in general, view the record in the light most favorable to him." Williamson v. Consolidated Rail Corp., 926 F.2d 1344, 1348 (3d Cir. 1991), reh'g en banc denied, 1991 U.S. App. Lexis 16758 (3d Cir. 1991). The Court may not evaluate the credibility of the witnesses, may not weigh the evidence, and may not substitute its view of the evidence for the jury's view. Rather, the Court must determine whether the evidence reasonably supports the jury's

verdict. See Dawn Equip. Co. v. Kentucky Farms, Inc., 140 F.3d 1009, 1014 (Fed. Cir. 1998); 9A Wright & Miller, Federal Practice & Procedure § 2524 at 249-266 (3d ed. 1995) ("The question is not whether there is literally no evidence supporting the party against whom the motion is directed, but whether there is evidence upon which the jury properly could find a verdict for that party.")

## **B. Discussion**

SeaChange cites ten reasons it contends require a judgment as a matter of law in its favor. The Court will address each contention below.

### **1. Whether nCUBE Failed to Demonstrate that the ITV Systems Have a Connection Manager That Maintains Information to Connect the Appropriate Service**

SeaChange contends that nCUBE did not demonstrate that the ITV systems have a connection manager that maintains information to connect the appropriate service as required by claims 1-3 of the '804 Patent. (D.I. 152 at 10). Specifically, SeaChange argues that nCUBE did not present any evidence that such information is maintained in the SeaChange Systems other than Dr. Schonfeld's conclusory opinion that this limitation was met. Id. Based on this, SeaChange contends it is entitled to judgment as a matter of law of non-infringement as to claims 1-3 of the '804 Patent. Id.

In response, nCUBE argues that there is substantial evidence

supporting the jury's finding that the connection manager ("CM")/streaming service ("SS" ) maintains information to connect the application service. (D.I. 157 at 20). nCUBE points out, for example, that Dr. Schonfeld testified that the ITV system "delegates all of the decision making, allowing for the connection to be established to an internal component called the connection manager/streaming service component. That component is a component that is internal to the system allowing for the communication and connection to an appropriate service." Tr. at 537:21-538:3; D.I. 157 at 21. nCUBE argues that this testimony makes clear that the CM/SS component maintains information to connect the application service. (D.I. 157 at 21). Further, nCUBE argues that SeaChange's Connection Manager Design Specification illustrates that the CM/SS component has tables that maintain information to connect the application service selected by the client. (D.I. 157 at 21; Ex 5 at SCH 39429 (CMS/SS table maintaining ApUID corresponding to the selected application service); 39434-35 (CM/SS databases that store information identifying the application service requested by a client); Ex. 2 at SCH 9840-42; Ex. 6 at SCH 40007-08, 40017-18 (information regarding application service)). Moreover, nCUBE contends that SeaChange never presented this argument at trial, and the Court cannot reevaluate the evidence and make an independent fact finding in the context of a motion for judgment

as a matter of law. (D.I. 157 at 21).

The Court concludes that in rejecting SeaChange's contention, the jury necessarily credited Dr. Schonfeld's testimony and concluded, contrary to SeaChange's assertion, that the ITV system has a connection manager that maintains information to connect the appropriate service. In evaluating a motion for judgment as a matter of law, the Court cannot consider the credibility of witnesses or substitute its judgment for that of the jury. Rather, the Court may only consider whether the jury's verdict was reasonable in light of the evidence. After reviewing the testimony of Dr. Schonfeld on both direct and cross-examination and SeaChange's technical documents, the Court cannot conclude that the jury erred by crediting his testimony on this issue. Thus, the Court concludes that SeaChange is not entitled to judgment as a matter of law of non-infringement based on this defense.

**2. Whether nCUBE Failed to Demonstrate that the ITV System has a Downstream Manager that Streams Multimedia Data From a Service to a Client.**

SeaChange contends that nCUBE failed to demonstrate that the downstream manager streams multimedia data from a service to a client as required by claims 1-3, 4, 6, 7, 9, 10, 12 and 14 of the '804 Patent. (D.I. 152 at 11). SeaChange argues that the ITV server architecture lacks such a limitation because it uses no

such gateways. Id. Further, SeaChange argues that Dr. Schonfeld avoided this issue entirely. Id. Based on this, SeaChange contends that no reasonable jury could have found that this claim limitation was present in the ITV system, and therefore, it is entitled to judgment as a matter of law of non-infringement.

In response, nCUBE argues that the record contains substantial evidence supporting the jury's finding that the ITV system has a downstream manager for sending a stream of multimedia data from a service to a client including Dr. Schonfeld's testimony and documentary evidence that establishes that the media cluster agent ("MCA") in the ITV system constitutes the claimed downstream manager. (D.I. 157 at 19). For example, nCUBE argues that Dr. Schonfeld explained that the application service is a component that is associated with a particular type of multimedia data (e.g. Movies On Demand Service), and is responsible for enforcing business rules in the ITV system, such as billing a client for a movie. Id. Further, nCUBE argues that Dr. Schonfeld explained that the application service in the ITV system corresponds to the service described in the '804 Patent and with the aid of a demonstrative exhibit, and in light of the Court's claim construction, explained how it satisfied the claim element. Id. at 19. Dr. Schonfeld testified that:

Q: Applying [the court's] definition, does what you've



identified as the downstream manager in this SeaChange system meet that definition?

A: Yes, it does.

Q: Can you explain how?

A: Yeah. [the claim construction] talks about a computer system component. The media cluster is the computer server where the video resides. And on top of it, there are- there is a computer system component known as media cluster agent. As we were reading the documents, you probably heard it referred to either as media cluster agent or MCA. And that, along with a component known as V streams, actually pump the multimedia data onto the second network. And [the claim] says it does send a stream of multimedia data. The stream of data can be both video and non-video.

Q: What do you mean by that?

A: When you are sending the application over here, for example, could be movies, or audio. The system does not care what particular application is chosen. As a matter of fact, it allows for a third party, other company, to say produce applications. So in this case, this could be audio or possibly movies.

Tr. 561:20-563:2. Further, nCUBE contends that SeaChange never made this argument at trial, and therefore, the Court cannot consider it at this time. (D.I. 157 at 18 n.11).

The jury in this case rejected SeaChange's contention when it made a finding of infringement. Additionally, the jury apparently credited Dr. Schonfeld's testimony with regard to this issue. After reviewing the briefs and Dr. Schonfeld's testimony, the Court concludes that the jury did not err in crediting Dr. Schonfeld's testimony as to this issue and the Court will not weigh the credibility of Dr. Schonfeld's testimony particularly in view of SeaChange's failure to adduce any evidence to rebut

this testimony. Thus, the Court concludes that SeaChange is not entitled to judgment as a matter of law on this contention.

**3. Whether nCUBE Failed to Demonstrate that the ITV Connection Manager is the Claimed Connection Service**

SeaChange contends that nCUBE failed to demonstrate that the ITV connection manager can be the claimed "connection service." (D.I. 152 at 12). Specifically, SeaChange contends that Dr. Schonfeld repeatedly emphasized that the connection service must be an internal component that does not interface directly with the network. Id. Additionally, SeaChange argues that Dr. Schonfeld repeatedly explained that the fundamental difference between the patent and the prior art was that the connection service did not have an interface to the networks, and therefore, was immune to changes in the networks. Id. at 13. Further, SeaChange contends that Dr. Schonfeld distinguished prior art from the claimed invention on the basis that it included a gateway element that also performed the functions of a connection service, stating: " If you are to look at [prior art] gateway-type architecture,...that component...tries to be both an upstream manager as well as a connection service...which means that it cannot have these distinct components doing it." (Tr. 1280:15-22). Moreover, SeaChange argues that the "connection service" that was identified in the ITV system was the combination of the connection manager and the streaming service,

which SeaChange contends, is an interface between the video server and the cable network because the stream control messages pass directly from the set top client to the connection manager over TCP/IP network connections, and therefore, distinguishes it from the claimed invention following nCUBE's own analysis. (D.I. 152 at 13-14). As a result, SeaChange argues, it is entitled to a judgment as a matter of law that it does not infringe any asserted claim of the '804 Patent. Id. at 14.

In response, nCUBE contends that SeaChange is simply arguing that the ITV system does not infringe because it performs extra functions, and that the Federal Circuit has rejected this argument. (D.I. 157 at 22; Vulcan Eng. Co. v. Fata Aluminum Inc., 278 F.3d 1366, 1374 (Fed. Cir. 2002) (explaining "[i]t is irrelevant whether an element has capabilities in addition to that stated in the claim. When the claimed function is performed in the accused system, by the same or equivalent structure, infringement of that claim element is established."). Further, nCUBE argues that, as the Court found in its claim construction, the upstream manager does not need to receive all the messages from the client. Therefore, because the CM/SS may receive some messages this does not avoid infringement. (D.I. 157 at 22). Moreover, nCUBE argues that Dr. Schonfeld's testimony does not preclude the presence of a connection service in the ITV system. Id. Specifically, nCUBE contends that Dr. Schonfeld explained

the difference between the '804 Patent and prior art in that the former discloses and claims a media server in which one component receives a client's request for connection to the server (i.e., the upstream manager), and another, distinct component (i.e., the connection service) makes decisions concerning connections between the client and the server and also between various components within the server itself. (Id.; Tr. 497:16-20; 536:11-537:7). By contrast, nCUBE argues the prior art discloses a server in which the same network-dependent component receives a request for connection to the server and makes all connection decisions. (D.I. 157 at 23; Tr. 487:24-488:21; 1280:15-22). Also, nCUBE argues that in the ITV system, just as in the claims of the '804 Patent, the SRM is the component that receives a client request for a connection, and the CM/SS is a separate component that determines how to make the necessary connections. (D.I. 157 at 23; Tr. 487:24-488:21; 1280:15-22). Based on this, the failure of SeaChange to argue this contention at trial, and SeaChange's failure to rebut Dr. Schonfeld's testimony on this issue, nCUBE contends that the jury's verdict of infringement is amply supported. (D.I. 157 at 23).

The principle that when the claimed function is performed in the accused system by the same structure, infringement is established regardless of the additional capacities of the accused system is undisputed. See Vulcan Eng. Co., 278 F.3d at

1374. Additionally, the Court finds that SeaChange mischaracterized Dr. Schonfeld's testimony. SeaChange argues that Dr. Schonfeld testified that the connection service must not directly interface with the network. However, the Court understands that Dr. Schonfeld testified, "that you provide minimal contact points with the network in terms of those interfaces, and you delegate the work internally to the server in a way that is, that does not interface with the network as much as possible." Tr. at 481:16-20 (emphasis added). A review of Dr. Schonfeld's testimony reveals that a difference between the claimed invention and the prior art was that the claimed invention discloses a media server where one component receives a client's request for a connection to a server (i.e. the upstream manager) and another separate component (i.e. the connection service) makes decisions concerning connections between the client and the server and also between the various components within the server itself. See Tr. at 497:16-20; 536:11-537:7. By contrast, Dr. Schonfeld testified the prior art discloses a server architecture in which the same component serves as a upstream manager as well as a connection service, where one component receives a request for a connection and also makes all connection decisions. See Tr. at 487-489; 1280:15-22. Further, Dr. Schonfeld testified that the ITV system contains the same architecture as the claimed invention because the SRM, which

receives a request for a connection, then delegates all of the decision making to the connection manager streaming service component. See Tr. at 537:8-538:11. Based on this record, the Court concludes that Dr. Schonfeld's testimony did not preclude the finding of a connection service in the accused system. Additionally, because this contention was not presented at trial, the Court declines to make an independent finding and substitute its judgment for that of the jury. Therefore, the Court concludes that SeaChange's motion for judgment as a matter of law on this issue must be denied.

**4. Whether nCUBE Failed to Demonstrate that the ITV Systems Have Two Networks on Separate Physical Infrastructures**

SeaChange contends that nCUBE failed to demonstrate that the accused ITV systems have two networks on separate physical infrastructures. (D.I. 152 at 15). Specifically, SeaChange contends that each accused ITV server was designed to work with a particular type of cable network, where the ITV servers and clients communicated and there was no suggestion that any other network (e.g. a telephone network) was ever involved in the communication process. Id. at 15. SeaChange also argues that nCUBE's assertion that separate wires (each running a few feet to connect a server to the rest of the cable network), along with the separate fibers in the fiberglass cable constitute separate "physical infrastructures", and thus separate networks within the

meaning of the claims defies common sense. SeaChange argues that nCUBE's approach is inconsistent with the ordinary English meaning of "infrastructure," which is "the underlying foundation or basic framework (as of a system of organization)." Webster's Third New International Dictionary of the English Language, Unabridged, p. 1161 (1993); see also D.I. 152 at 16. Based on this, SeaChange contends that wires or glass fibers cannot constitute separate infrastructures, and therefore, SeaChange is entitled to a judgment as a matter of law of non-infringement. (D.I. 152 at 16).

In response, nCUBE contends that there was substantial evidence to support the jury's finding that the accused ITV system has two separate networks. (D.I. 157 at 15). Specifically, nCUBE argues that it presented documentary evidence establishing that the ITV system operates with two separate networks including SeaChange's own Connection Manager Product Specification which identifies two separate upstream and downstream networks. (D.I. 157 at 12; Ex. 2 at SCH039787). Additionally, nCUBE contends that Dr. Schonfeld addressed the first and second network elements in light of the Court's claim construction and explained how the ethernet link coupled with the SRM constitutes the first network, and the DVB/ASI link coupled to the MCA constitutes the second network in the accused ITV system. (D.I. 157 at 12-13; Tr. at 552:18-553:19; Tr. at 602:5-

7). Finally, nCUBE contends that SeaChange's challenge to the jury's attributed meaning to "infrastructure" is flawed, given that "infrastructure" is a part of the Court's claim interpretation, and the Court correctly ruled that the parties could not interpret the Court's construction. (D.I. 157 at 15; Tr. at 1052:1-14; 1055:11-19).

The asserted claims of the '804 Patent provide for an "upstream manager being coupled to a first network," and a "downstream manager being coupled to a second network." '804 patent at col. 25, lines 7-8, 11-12. The Court construed the "first network" to mean:

[A] communication path that: (a) is used for sending information from a client to a media server; (b) is distinct from the second network existing on a separate physical infrastructure; and (c) which may be either unidirectional or bi-directional.

(D.I. 112). Additionally, the Court construed "second network" to be "distinct from the first network existing on a separate physical infrastructure." (D.I. 112). After reviewing the claim construction, the documentary evidence, Dr. Schonfeld's testimony concerning the first and second network elements, and Dr. Jaffey's testimony, the Court concludes that the jury did not err in finding that the accused system has two separate networks on separate physical infrastructures. Specifically, SeaChange's Connection Manager Specification states that "[t]he DBDS consists



of a HFC (Hybrid Fiber/Coax) delivery network with DVB/ASI feeds and an ATM network for IP messaging." Ex. 2 at SCH 039787. The Court concludes that this statement from the Connection Manager Specification supports a finding of two separate networks in the ITV system. Moreover, Dr. Schonfeld addressed the first and second network elements and explained how each element was present in the ITV system. Specifically, he explained that the ethernet link coupled with the SRM constitutes the first network and that the DVB/ASI coupled to the media cluster agent constitutes the second network. See Tr. at 552:18-553:19; Tr. at 602:5-7; see also Tr. at 555:15-560:21; Tr. at 622:2-17; Tr. at 563:8-564:14; Tr. at 659:10-660:13. Additionally, Dr. Jaffey, SeaChange's expert, admitted on cross-examination that there are separate wires for carrying out-of-band data and in-band data. Tr. at 1228:14-22. Although Dr. Jaffey, noted that "[t]hey're separate wires, but I wouldn't say they're necessarily different infrastructures", the Court cannot conclude as a matter of law that the jury erred in rejecting this testimony. Tr. at 1228:18-20. Based on this record, the Court concludes that SeaChange is not entitled to judgment as a matter of law on these grounds.

**5. Whether nCUBE Failed to Demonstrate that the ITV Systems Allocate a Downstream Logical Address to a Client, or That They Update a Connection Service Table With Such an Address**

SeaChange contends that nCUBE failed to demonstrate that the

ITV systems allocate a downstream logical address to a client. (D.I. 152 at 17). Specifically, SeaChange argues that claims 4, 6, 9, 10, 12 and 14 all include a limitation that requires "allocating a...downstream logical address to said client" and the "updating a connection service table...with said downstream logical address for said client." Id.; '804 Patent col. 25 lines 26- col. 26, line 63). SeaChange argues that the claims require a client logical address, which Dr. Schonfeld did not identify. (D.I. 152 at 17). Rather, SeaChange contends that Dr. Schonfeld identified a downstream manager logical address which is not required by the claims, and therefore, SeaChange argues that the ITV systems cannot infringe claims 4, 6, 9, 10, 12 and 14 as a matter of law. Id.

In response, nCUBE contends that Dr. Schonfeld's testimony and technical documentation support the jury's finding that the ITV system allocates a downstream logical address. (D.I. 157 at 17). nCUBE argues that Dr. Schonfeld's testimony established that the ITV system allocates a downstream logical address by assigning a stream ID that identifies the port from which a video stream is sent to the client. Id. Further, nCUBE contends that Dr. Schonfeld also explained that the ITV system updates connection tables maintained in the CM/SS component with the stream ID. Id. Lastly, nCUBE argues that SeaChange's assertion that Dr. Schonfeld did not identify a "downstream client logical

address" is incorrect because the claim language requires a downstream logical address and not a downstream client logical address, and nCUBE cited Dr. Schonfeld's testimony out of context, and when viewed in its entirety, it is evident that Dr. Schonfeld identified the stream ID as the downstream logical address. Id. at 18.

Claim 4 of the '804 Patent requires "allocating a downstream physical address and downstream logical address to said client..." '804 Patent col. 25, lines 32-33 (emphasis added). Therefore, the jury's rejection of SeaChange's argument that Dr. Schonfeld did not describe the claim limitation was not unreasonable because the claim requires a downstream logical address rather than a downstream client logical address as SeaChange contends. Dr. Schonfeld testified that the ITV system updates a connection service table with such downstream logical address for the client. Tr. at 576:3-8. Specifically, Dr. Schonfeld testified that the ITV system updates connection tables maintained in the connection manager streaming service component with the stream ID. Tr. at 576:9-17. Based on this record, and SeaChange's failure to rebut Dr. Schonfeld's testimony, the Court concludes that the jury did not err in finding that the ITV system allocated a downstream logical address to a client, or that they update a connection service table with such an address. Therefore, the Court concludes that SeaChange is not entitled to

judgment as a matter of law.

#### **6. Whether the SRM in the ITV System is an Upstream Manager**

SeaChange contends that the undisputed evidence establishes that the SRM in the ITV system is not an "upstream manager" because it does not accept messages from a client bound for services on the server or route those messages to such services. (D.I. 152 at 18). SeaChange argues that the Court ruled that an "upstream manager" must "'accept[] messages from a client bound for services on the server' and then 'route' those messages to those services.'" D.I. 152 at 18 (quoting D.I. 113 at 9) (emphasis added). SeaChange contends that the ITV system cannot infringe because it is undisputed that the SRM does not accept messages that are already bound for services on the server, rather, the "Session Setup Request Message" is bound only for the SRM itself. (D.I. 152 at 18). Further, SeaChange contends that the message in the ITV system is not merely routed to its intended destination as in the '804 Patent, rather, the SRM in the ITV system determines if the system has adequate resources to accept the message. If it does, it generates a different message and sends that message to the connection service and not the application manager, and if it does not, the second message never gets generated. Id. Thus, SeaChange contends that no reasonable jury could have found that the "Session Setup Request Message" was "bound for services on the server" or that the SRM "routes"

the "message from the client to the services on the server", and therefore, it is entitled to a judgment as a matter of law of non-infringement. Id. at 19.

In response, nCUBE contends that the record evidence supports the jury's finding that the ITV system contains an upstream manager. (D.I. 157 at 15). Specifically, nCUBE argues, Dr. Schonfeld testified that the SRM receives messages that identify a client and a movie requested by the client, and then routes the messages with that same information to other services in the ITV system, such as the application service. (D.I. 157 at 16). Additionally, nCUBE argues that the Connection Manager Product Specification supports a finding of an upstream manager in the ITV system because it states that the SRM "'is capable to manage routing.'" (D.I. 157 at 16; Ex. 2 at SCH 39792). Further, nCUBE argues that the jury was free to reject Steven Davi's testimony that the ITV system does not route messages from a client to services on a server. (D.I. 157 at 16).

The Court construed "upstream manager" to mean:

A computer system component that (a) accepts messages from a client bound for services on a server; (b) routes messages from a client to services on a server; and (c) is distinct from the downstream manager

D.I. 113. Dr. Schonfeld testified that the SRM in the ITV system routes messages from a client to services on the server.

Tr. at 554:23-555:13. Specifically, Dr. Schonfeld testified that, "[m]essages sent from the client set-top device are an identification of what movie you'd like to see and who the client is...That particular information is sent and routed, it is directed to the application server." Tr. at 555:3-13. On the other hand, Mr. Steven Davi, SeaChange's Vice President of ITV engineering, testified that despite his deposition testimony, the ITV system does not route messages from a client to services on a server. Mr. Davi, acknowledged that he used the term routing in his deposition, but testified at trial that:

[W]hat we were describing was how the streaming service determines which application to talk to, in this case, movies on demand. And it does that with a message, with information that was in a message sent by the client. And so I was using route in the non-networking- I wasn't using the networking term for route, I was trying to think of a word like lines that's consistent.

Tr. at 1164:12-1165:3. The jury obviously weighed the credibility of Dr. Schonfeld and Mr. Davi's testimony in finding that the ITV system contained an upstream manager. Therefore, the Court cannot conclude as a matter of law that the jury erred in finding an upstream manager in the ITV system. Thus, the Court concludes that SeaChange is not entitled to judgment as a matter of law based on this defense.

## **7. Whether the Scientific Atlanta Systems Can Infringe**

SeaChange contends that two thirds of the accused systems,

the Scientific-Atlanta systems ("Scientific-Atlanta"), cannot infringe because the SRM or "upstream manager" is not included among the components provided to the customers. (D.I. 152 at 20). As a result, SeaChange contends, sales of the Scientific-Atlanta cannot constitute direct infringement of the '804 Patent. Id. Further, SeaChange argues that sales of the Scientific-Atlanta cannot constitute indirect infringement because there was no proof of direct infringement, there was no knowledge of wrongful purpose, design or adaptation for use of infringement or lack of substantial non-infringing uses, all of which are necessary to find indirect infringement. Id. at 21. Additionally, SeaChange contends that nCUBE failed to introduce evidence of affirmative knowledge or wrongful purpose, which is necessary to find active inducement infringement liability and contributory liability. Id. at 22-23. Specifically, SeaChange contends that it was not aware of the '804 Patent until the instant lawsuit was filed, and promptly consulted counsel who advised that the design of the ITV system did not infringe the '804 Patent. Id. at 23. As a result, SeaChange contends that it is entitled to judgment as a matter of law Id.

In response, nCUBE contends that SeaChange is liable for indirect infringement for sales of the Scientific-Atlanta systems with pre-existing SRM systems because as Dr. Schonfeld testified, the SRM was fundamental to the operation of the ITV system, and

there was evidence of contributory infringement and induced infringement. (D.I. 157 at 23-25). nCUBE argues that a party is liable for contributory infringement if: "(1) it knowingly sells a product that is 'especially made or especially adapted for use in an infringement of such patent,' and (2) the product is 'not a staple article or commodity of commerce suitable for substantial noninfringing use.'" Id. at 24-25 (quoting 35 U.S.C. § 271(c)). nCUBE contends that the record evidence establishes these two elements. For example, nCUBE argues that Mr. Davi testified that the ITV system was especially adapted for use in an infringing manner (i.e. for use with pre-existing SRMs). (D.I. 157 at 25) (quoting Tr. at 1175:18-24; Tr. at 1154:18-24). Additionally, nCUBE argues that the record demonstrates that the ITV system lacks any noninfringing use because its purpose is to provide interactive services to clients and there is no dispute that SeaChange had knowledge of the '804 Patent since January 2001. (D.I. 157 at 25). Second, nCUBE argues that SeaChange is liable for induced infringement because the evidence demonstrates that SeaChange: "(1) actively designs the ITV system to work with its customer's systems ...(2) sells the ITV system for use with pre-existing components ...; and (3) provides customers with operations manuals and user instructions for operating the ITV system ..." D.I. 157 at 26 (citations omitted). Finally, nCUBE argues that induced infringement does not require intent to



infringe; however, even if it did, nCUBE asserts that it met that standard, given the jury's finding of willful infringement. Id.

With respect to contributory infringement, the Court concludes that nCUBE offered substantial evidence at trial that SeaChange's ITV system was not a staple item suitable for substantial noninfringing use under 35. U.S.C. 271 (c). Specifically, SeaChange's Management and Operations Guide states that "[t]he SeaChange ITV System is a computer-automated solution for implementing interactive television applications." (D.I. 157 Ex. 4 at 33602). Additionally, Mr. Davi admitted that SeaChange designs the Scientific-Atlanta system to operate with a pre-existing SRM. See Tr. at 1175:18-24. Further, Mr. Davi testified that the purpose of the SeaChange ITV system is to deliver videos on demand. Specifically, Mr. Davi testified that: "Q. Other than delivering MPEG video, does the SeaChange ITV system have any other commercial purpose? A. It delivers videos on demand. That's what it does today." Tr. at 1176:5-9. Based on this, the jury was able to reject SeaChange's assertions that the Scientific-Atlanta system had other potential uses because the record does not indicate any other actual uses of the Scientific-Atlanta system. Therefore, the Court concludes that substantial evidence supports the jury's finding of contributory infringement with respect to SeaChange's Scientific-Atlanta system.

With respect to inducing infringement under 35 U.S.C. § 271 (b), the Court concludes that nCUBE met its burden of showing that SeaChange's actions induced infringing acts and that SeaChange knew or should have known that its actions would induce infringement. See Mentor H/S Inc. v. Medical Devices Alliance, Inc., 244 F.3d 1365, 1379 (Fed. Cir. 2001) (citing C.R. Bard, Inc. v. Advanced Cardiovascular Sys. Inc., 911 F.2d 670, 674 (Fed. Cir. 1990)). The level of intent that is required to establish inducement is "actual intent to cause the acts which constitute the infringement." Hewlett-Packard Co. v. Bausch & Lomb, Inc., 909 F.2d 1464, 1469 (Fed. Cir. 1990). Additionally, although proof of intent is necessary, direct evidence is not required, rather, circumstantial evidence of intent may suffice. See Moleculon Research Corp. v. CBS, Inc., 793 F.2d 1261, 1272 (Fed. Cir. 1986). In the instant case, SeaChange presented the following circumstantial evidence in support of its inducement case: (1) SeaChange designs the ITV system to work with its customers systems, see Tr. at 1175:18-245; (2) SeaChange sells the ITV system for use with pre-existing components, such as the Scientific- Atlanta system, see Tr. at 1154:3-7; and (3) SeaChange provides its customers with operations manuals and user instructions for operating the ITV systems, See D.I. 157 at Ex. 4 ("Management and Operations Guide"); and Ex. 8 (ITV System Presentation for customer). Evidence of sales and instruction

manuals supports a finding of induced infringement. See, e.g., Water Techs. Corp. v. Calco, Ltd., 850 F.2d 660, 668 (Fed. Cir. 1988) (affirming inducement finding based on circumstantial evidence including helping customers and providing instructions); Moleculon Research Corp. v. CBS, Inc., 793 F.2d 1261, 1272 (Fed. Cir. 1986) (affirming finding of inducement based on circumstantial evidence such as extensive sales and instruction manual). SeaChange argues that any evidence of its intent is negated by the fact that it had no knowledge of the '804 Patent prior to the filing of the instant lawsuit and that after it had knowledge it sought the advice of counsel whose opinion informed them that the ITV system did not infringe the '804 Patent. Although, SeaChange presented this opinion of non-infringement, the jury nonetheless found willful infringement, apparently rejecting SeaChange's assertion that it relied in good faith on the opinion of counsel. Therefore, the Court concludes that substantial evidence supports the jury's verdict that SeaChange induced infringement because it sold the ITV systems with the intent that customers would use it to perform the patented method. Thus, the Court concludes that SeaChange is not entitled to judgment as a matter of law.

#### **8. Whether nCUBE Presented Sufficient Evidence Under the Doctrine of Equivalents**

SeaChange contends that, over its objection, the Court

submitted the issue of infringement under the doctrine of equivalents to the jury, even though nCUBE never mentioned the doctrine of equivalents throughout its entire case. On this record, SeaChange contends that the doctrine of equivalents finding cannot stand because nCUBE failed to offer the required “‘particularized testimony and linking argument.’” D.I. 152 at 24 (quoting Lear Siegler v. Sealy Mattress Co. of Michigan, 873 F.2d 1422, 1425-27 (Fed. Cir. 1989)). As a result, SeaChange contends that it is entitled to judgment as a matter of law that it does not infringe any of the asserted claims under the doctrine of equivalents. (D.I. 152 at 25).

In response, nCUBE contends that the record supports the jury’s finding that the ITV system infringes under the doctrine of equivalents. (D.I. 157 at 28). Specifically, nCUBE contends that the tests for determining infringement under the doctrine of equivalents and for infringement of means-plus function claims “‘are closely related’ and involve applying similar analyses of insubstantiality of the differences.’” D.I. 157 at 28 (quoting Chiuminatta Concrete Concepts, Inc. v. Cardinal Indus., Inc., 145 F.3d 1303, 1310 (Fed. Cir. 1998)). Therefore, nCUBE contends that evidence supporting infringement of a means-plus function claim also supports a finding of infringement by equivalents. (D.I. 157 at 28). For example, nCUBE argues that based on Dr. Schonfeld’s testimony regarding infringement of the means-plus-

function claims (10, 12 and 14), the jury could have also reasonably found that the ITV system also infringes under the doctrine of equivalents and because the jury returned a general verdict finding infringement by equivalents, the Court may presume that the jury found that one element was met by equivalents and the “remainder of the claim elements were met literally.” (D.I. 157 at 28 quoting Comark Communications, Inc. v. Harris Corp., 156 F.3d 1182, 1188 (Fed. Cir. 1999)). Accordingly, nCUBE contends, the jury’s verdict must be affirmed if “a reasonable jury could have found that at least one element was met by equivalents.” Id. (quoting Comark, 156 F.3d at 1188). For example, nCUBE argues that each asserted claim has an upstream element, and given the jury’s finding that the ITV system literally infringes claim 10, the jury necessarily found that the SRM in the ITV system performs identical functions as the upstream manager. (D.I. 157 at 29). Therefore, nCUBE argues that, given the jury’s finding that the ITV system literally infringed claim 10 of the ‘804 Patent, it must have found that the SRM operates in substantially the same way to achieve substantially the same result as the upstream manager, and therefore, evidence supporting literal infringement of claim 10 also supports a finding that the upstream manager is met equivalently by the SRM. (D.I. 157 at 29).

For there to be infringement under the doctrine of

equivalents, the accused product or process must embody every element of a claim either literally or by an equivalent. LifeScan, Inc. v. Home Diagnostics, Inc., 103 F. Supp. 2d 345, 359 (D. Del. 2000) (quoting Warner-Jenkinson Co. v. Hilton Davis Chemical Co., 520 U.S. 17, 41 (1997)). Therefore, the mere showing that an accused device is equivalent overall to the claimed invention is insufficient to establish infringement under the doctrine of equivalents. LifeScan, 103 F.Supp. 2d at 359.

The primary inquiry in applying the doctrine of equivalents is whether "the differences between the claimed invention and the accused device are ... 'insubstantial.'" Dawn Equip. Co. v. Kentucky Farms, Inc., 140 F.3d 1009, 1014 (Fed. Cir. 1998). The determination of whether the differences between the claimed invention and the accused device are insubstantial involves the question of whether "the element of the accused device at issue performs substantially the same way, to achieve substantially the same result, as the limitation at issue in the claim." Id. at 1016 (detailing the function/way/result inquiry). To this effect, the United States Supreme Court has emphasized that the "particular linguistic framework" used is less important, so long as it addresses the "essential inquiry [of whether] the accused product or process contain[s] elements identical to or equivalent to each claimed element of the patented invention.'" Warner-Jenkinson, 520 U.S. at 40. The Supreme Court explained that

"the determination of equivalence should be applied as an objective inquiry on an element-by element basis." Id.

The policy behind the doctrine of equivalents is to prevent a device from being copied with minor changes and substitutions which would add nothing to the invention, but would be enough to take the copied device outside the precise language of a claim. See Graver Tank & Mfg. Co. v. Linde Prods., Co., 339 U.S. 605, 607 (1950). However, a broad application of this policy may conflict with the statutory requirement that a patentee distinctly claim the invention covered by the patent. Warner-Jenkinson, 520 U.S. at 29; see also 35 U.S.C. § 112. In order to prevent the doctrine from expanding a patent's protection beyond the scope of its claims, the Federal Circuit has warned that the application of the doctrine of equivalents should be "the exception ... [and] not the rule" in patent infringement actions. London v. Carson Pirie Scott & Co., 946 F.2d 1534, 1538 (Fed. Cir. 1991).

The question of equivalence may be decided by a jury. However, the Federal Circuit has recognized that the doctrine of equivalents is conceptually difficult to apply. LifeScan, 103 F. Supp. 2d at 360. In order to reduce the risk of jury confusion over the doctrine, the patentee must present "particularized testimony and linking argument" as to why the function way and result of each element in the accused device is substantially the

same as the elements of the claimed invention. Generalized testimony concerning the similarities between the claims and the accused device and evidence or argument subsumed in a plaintiff's case of literal infringement are insufficient to establish infringement under the doctrine of equivalents. Rather, a plaintiff must "articulate the comparison" between the claimed elements and the elements of the accused device and present "substantial evidence" comparing the claimed elements and the accused device in each of the aspects of equivalency (i.e. the function, way and result inquiry). See Malta v. Schulmerich Carillons, Inc., 952 F.2d 1320, 1329 (Fed. Cir. 1991); Lear Siegler v. Sealy Mattress Co. of Mich., 873 F.2d 1422, 1427 (Fed. Cir. 1989); LifeScan, 103 F.Supp. 2d at 360.

After reviewing the testimony of nCUBE's experts and argument presented by its counsel, the Court concludes that nCUBE failed as a matter of law, to present the particularized testimony and linking argument required to support a verdict of infringement under the doctrine of equivalents. nCUBE, relying on Comark Communications v. Harris, argues that since there was a general jury verdict finding both literal infringement and infringement of the doctrine of equivalents, rather than a finding of infringement as to each element of each claim, the jury may assume that one element of a claim was met by equivalence and the rest were met literally.



The Court concludes that nCUBE's argument that the literal infringement finding for claims 10, 12 and 14 (the means-plus function claims) supports a finding for infringement under the doctrine of equivalents, is unpersuasive and unsupported by relevant case law. Additionally, the Court concludes that Dr. Schonfeld's testimony regarding the equivalence of the SRM in the ITV system to the upstream manager in the '804 Patent is vague. Although Dr. Schonfeld testified as to the function prong of the equivalence analysis, he failed to address the way and result prongs of the equivalence inquiry. For example, Dr. Schonfeld, in regard to literal infringement, testified that the SRM in the SeaChange ITV system performs the function of the upstream manager in the ITV system, thereby satisfying the function prong of the equivalence analysis. Tr. at 593:6-14. However, beyond that, Dr. Schonfeld, in the context of a literal infringement analysis, merely stated that the SRM has the same structure of the upstream manager. Tr. at 593:21-23. In sum, the Court finds that Dr. Schonfeld never articulated a complete function, way and result analysis with respect to the equivalence of the upstream manager in the asserted claims and the SRM in SeaChange's ITV system.

nCUBE's counsel did not raise a separate and distinct equivalence argument. In fact, counsel for nCUBE did not mention the doctrine of equivalents in its closing arguments or

in the questioning of its experts. Thus, it is clear that nCUBE failed to present "particularized testimony and linking argument" on the issue. Instead counsel for nCUBE chose to focus its efforts on literal infringement. Therefore, the Court concludes that nCUBE did not present sufficient evidence to support the jury's verdict of infringement under the doctrine of equivalents. Accordingly, the Court will grant SeaChange's motion for judgment as a matter of law.

**9. Whether nCUBE Failed to Prove by Clear and Convincing Evidence that SeaChange Willfully Infringed the '804 Patent**

SeaChange contends that nCUBE failed to prove by clear and convincing evidence that SeaChange willfully infringed the '804 Patent. In support of its contention, SeaChange argues that the undisputed facts show that SeaChange was not aware of the '804 Patent until it was sued by nCUBE on January 8, 2001 and that SeaChange promptly consulted with an experienced patent attorney, Larry Nixon, who was knowledgeable in the relevant field, and who provided a thirty-two page letter opining that SeaChange's products did not infringe the '804 Patent. (D.I. 152 at 25-26). Additionally, SeaChange contends that the fact Mr. Nixon was not provided with every design document related to the ITV system is not a sufficient basis to negate good faith where there is no evidence that the information that the attorney did receive was inadequate. Id. at 27. Finally, SeaChange argues that nCUBE's

suggestion that there was something venal about SeaChange not keeping old drafts of the Nixon opinion is not probative regarding the question of willfulness. Id.

In response, nCUBE contends that the evidence adduced at trial establishes that SeaChange did not seek an opinion of counsel in good faith. (D.I. 157 at 30). Specifically, nCUBE argues that SeaChange failed to provide Mr. Nixon with crucial engineering documents necessary to form a complete understanding of the operation of the ITV system, namely the Connection Manager Product Specification, a document containing architectural diagrams and a discussion of the ITV system. Id. Additionally, nCUBE argues that Mr. Gerovac and other SeaChange employees answered Mr. Nixon's questions, thereby managing the form and content of the information that Mr. Nixon considered. Id. at 30-31. Also, nCUBE argues that SeaChange did not rely on the opinion in good faith because the record establishes that SeaChange destroyed two prior opinions during the pendency of the litigation and failed to present any evidence corroborating Mr. Gerovac's testimony that the destroyed opinions were not materially different from the third opinion. Id. at 32-33.<sup>1</sup>

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<sup>1</sup>After the submission of these briefs and approximately six months post-trial SeaChange submitted declarations and the drafts of the Nixon opinion that were found post-trial. The Court will not consider this evidence in regard to the jury's finding of willfulness or in the context of the motion for a new trial because this evidence was not before the jury and it is not newly

Therefore, nCUBE argues when viewing the evidence in the light most favorable to nCUBE and drawing all reasonable inferences in its favor, the record contains more than sufficient evidence to support the jury's finding of willful infringement. Id. at 34.

Whether infringement is willful is a question of fact, and must be established by clear and convincing evidence. Comark, 156 F.3d at 1190 (citations omitted). In the context of a motion for judgment as a matter of law, the question for the Court is whether substantial evidence supports the jury's finding of willfulness, in other words whether SeaChange has met its burden of showing that "'no reasonable juror could find the asserted proof of willfulness rose to the quantum of clear and convincing evidence.'" Comark, 156 F.3d at 1190 (citations omitted); see also Pannu v. Iolab Corp., 155 F.3d 1344, 1348 (Fed. Cir. 1998) (outlining standard of review for judgment as a matter of law). SeaChange bases its argument that no reasonable juror could have found clear and convincing evidence of willfulness almost exclusively upon the fact that it obtained a legal opinion from Mr. Nixon which advised that it did not infringe the '804 Patent. The primary consideration in a determination of willfulness is:

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discovered evidence because although "misplaced" it was not "truly unobtainable" at the time of trial. The Court will, however, consider this evidence on a limited basis in its discretionary enhancement of damages analysis as discussed in this Memorandum Opinion infra, Sections, V.(A)(2), and VI.

whether the infringer, acting in good faith and upon due inquiry, had sound reason to believe that it had a right to act in the manner that was found to be infringing. The law of willful infringement does not search for minimally tolerable behavior, but requires prudent, and ethical legal and commercial actions.

SRI Int'l v. Advanced Tech Labs, Inc., 127 F.3d 1462, 1464-65

(Fed. Cir. 1997). A potential infringer, having actual notice of another's patent right has an affirmative duty of due care, which would normally entail obtaining competent legal counsel. Amsted Indus., Inc. v. Buckeye Steel Castings Co., 24 F.3d 178, 181 (Fed. Cir. 1994). However, an opinion from counsel alone does not dictate a finding that the infringement was not willful, rather, the analysis is whether under the totality of circumstances, SeaChange acted in disregard of the '804 Patent and lacked a reasonable basis for believing it had a right to do what it did. Amsted, 24 F.3d at 181-182.

SeaChange contends that it relied in good faith on the competent legal opinion of Mr. Nixon. However, nCUBE argues that this opinion was not fully informed. Specifically, nCUBE argues that Mr. Gerovac and other SeaChange employees did not give Mr. Nixon crucial engineering documents. For example, nCUBE points to Mr. Gerovac's testimony where he admitted that SeaChange did not give Mr. Nixon a copy of the ITV system's Connection Manager Product Specification, which has become the focus of the instant litigation. Specifically, Mr. Gerovac testified that:

A. We did not give him a connection manager document, and the reason was that at that initial- at that early time in the- you know, this was days after the complaint was filed we didn't know what was the focus of this suit...

Q. Okay. Mr. Nixon's opinion is- his written opinion was rendered- was given to you- delivered to you on April 23, 2001; correct?

A. That is correct.

Q. All right. Now, sir, at any time between January 8<sup>th</sup> when the lawsuit was filed and the time that Mr. Nixon actually rendered his opinion, did you ever give him the connection manager specification, PX-11?

A. No. I did not...

Tr. at 772:9-13; 773:3-12. The opinion of competent counsel must be premised on the "best information known to the defendant.

Otherwise the opinion is likely to be inaccurate and will be ineffective to indicate the defendant's good faith intent."

Comark, 156 F.3d at 1191. Additionally, nCUBE points to testimony that demonstrates that Mr. Nixon provided Mr. Gerovac with a written opinion in February of 2001. See Tr. at 800:23-801:13. Mr. Gerovac reviewed the opinion, provided comments and then recycled the draft as he did with a second draft. As Mr. Gerovac testified:

Q. Did you retain the drafts

A. No.

Q. What did you do with those drafts?

A. Recycled them.

Q. Okay, when you say recycled them; they're no longer available, they've been destroyed?

A. Yes.

Tr. at 804:22-805:9.

In the context of a motion for judgment as a matter of law, the Court must determine, in light of all the evidence presented to the jury, and reasonable inferences therefrom, if there was substantial evidence to support the jury's verdict that nCUBE proved willfulness by clear and convincing evidence. The Court concludes, based on a consideration of the record evidence, that there was substantial evidence to support a finding that Mr. Nixon's opinion was not premised on the best information known to SeaChange, for example, the Connection Manager Product Specification. Therefore, the Court concludes that the jury's verdict of willfulness is supported by substantial evidence that contravened SeaChange's evidence, and accordingly, the motion for judgment as a matter of law as to willfulness will be denied.

**10. Whether SeaChange is Entitled to Judgment as a Matter of Law as to Validity**

SeaChange contends that if the claims of the '804 Patent are construed to cover the accused ITV systems, they are necessarily invalid in view of the undisputed prior art. (D.I. 157 at 28). In other words, SeaChange claims if the motion for judgment as a matter of law is denied as to infringement, the Court should grant its judgment as a matter of law as to validity. Id. Although, in its Opening Brief in support of its motion SeaChange states that "[b]ecause the relevant factual evidence is

undisputed, this Court may find the '804 patent claims invalid as a matter of law", they contend in their Reply Brief that their argument was merely meant to "point out that no reasonable jury could have accepted nCUBE's broad gloss on the patent claims to find infringement, while simultaneously ignoring that gloss to find validity." (D.I. 152 at 29; D.I. 171 at 4). As a result, SeaChange argues that they did not have to move for judgment as a matter of law with respect to validity at the close of evidence and that it is entitled to a new trial based on the inconsistency of the noninfringement and invalidity verdicts. (D.I. 171 at 4).

In response, nCUBE argues that because SeaChange failed to make a pre-verdict motion for judgment as a matter of law on the issue of invalidity, it waived its right to challenge the jury's finding that the claims are not invalid. (D.I. 152 at 7). Alternatively, nCUBE argues that even apart from the waiver, the record supports the jury's finding that SeaChange failed to carry its burden of proving invalidity by clear and convincing evidence. (D.I. 157 at 24).

After reviewing the record, the Court concludes that SeaChange has waived its right to challenge the jury's finding that the claims were not invalid. Specifically, as SeaChange concedes, it failed to raise the issue of validity in its pre-verdict motion. (D.I. 171 at 4 (stating that there was no requirement for SeaChange to move for judgment as a matter of law



on the issue of invalidity; D.I. 157 at Tab 10). The record also demonstrates that SeaChange did not preserve its rights on the issue with an oral motion. After the close of SeaChange's rebuttal, SeaChange's Counsel stated "Your Honor, the defense rests, and we renew our motion [that] we put in submission[,] the Court had a written brief on that." Tr. at 1247:8-11. Then, at the close of all of the evidence, SeaChange's Counsel stated that "[w]e renew our motion." Tr. at 1305:5. Accordingly, the Court will not review SeaChange's contentions with regard to validity. See, e.g., Hopp v. City of Pittsburgh, 194 F.3d 434, 440 (3d Cir. 1999) (holding that since Defendant did not raise an issue in its initial motion for judgment as a matter of law it waived its right to raise the argument); Bonjorno v. Kaiser Aluminum & Chem Corp., 752 F.2d 802, 814 (3d Cir. 1984) ( "If the issue was not raised in the motion for the directed verdict at the close of all the evidence, it is improper to grant the JNOV on that issue."). Therefore, the Court will deny SeaChange's Motion for Judgment as a Matter of Law as to the issue of invalidity.

In sum, the Court denies SeaChange's Motion for Judgment as a Matter of Law with regard to literal infringement and validity. However, the Court grants SeaChange's Motion for Judgment as a Matter of Law with regard to infringement under the doctrine of equivalents.

#### **IV. SeaChange's Motion For a New Trial on Certain Issues**

### **A. Legal Standard For The Grant Of A New Trial**

In pertinent part, Federal Rule of Civil Procedure 59(a) provides:

A new trial may be granted to all or any of the parties and on all or part of the issues in an action in which there has been a trial by jury, for any of the reasons for which new trials have heretofore been granted in actions at law in the courts of the United States.

Fed. R. Civ. P. 59(a). Among the most common reasons for granting a new trial are the following: (1) the jury's verdict is against the clear weight of the evidence, and a new trial must be granted to prevent a miscarriage of justice; (2) newly discovered evidence exists that would likely alter the outcome of the trial; (3) improper conduct by an attorney or the court unfairly influenced the verdict; or (4) the jury's verdict was facially inconsistent.

The decision to grant or deny a new trial is committed to the sound discretion of the district court. However, where the ground for a new trial is that the jury's verdict was against the great weight of the evidence, the court should proceed cautiously, because such a ruling would necessarily substitute the court's judgment for that of the jury. Klein v. Hollings, 992 F.2d 1285, 1290 (3d Cir. 1993).

### **B. Discussion**

#### **1. Whether the Jury's Verdict Was Logically Inconsistent or**

### **Against the Great Weight of the Evidence**

By its motion, SeaChange contends that it is entitled to a new trial because the jury's verdict was logically inconsistent and against the great weight of the evidence. (D.I. 152 at 42). Specifically, SeaChange contends that nCUBE's expert failed to identify numerous claim limitations in the SeaChange ITV system, and failed to provide a meaningful rebuttal to SeaChange's invalidity showing. Id. Finally, SeaChange argues that the jury's finding of infringement and its failure to find the claims anticipated were inconsistent. Id. The Court has recounted SeaChange's arguments with regard to infringement and willfulness in the Judgment as a Matter of Law section of this Memorandum Opinion, so the Court will only set out SeaChange's contentions with regard to validity here.

First, SeaChange argues that the SGI video server anticipates all of the asserted claims. (D.I. 152 at 31). Specifically, SeaChange contends that the SGI video server has a connection manager, an upstream manager which accepts messages from a client and routes these messages, and a downstream manager which is called the media delivery service and distinct networks connect the client to the upstream manager and downstream manager. Id. at 33-34, 36. SeaChange contends that since each element of claim 1 and all the remaining claims are present in the SGI server reference, Dr. Kurose correctly determined that

the SGI server system invalidated all the asserted claims in the '804 Patent. Id.

Second, SeaChange asserts that the TCP/IP Sockets reference anticipates all of the asserted claims. Id. at 36. In support of this, SeaChange argues that the inventor of the '804 Patent admitted that he took the idea of abstracting interfaces to the network from a prior art textbook describing the TCP/IP sockets reference. Id. at 37. Additionally, SeaChange contends that the TCP/IP Sockets reference has an upstream manager called a "TCP Input," a downstream manager called "TCP Output," and a connection service called a data structure that maintains information to connect the input, output, and services on the server. Id. at 38. Further, SeaChange argues that Dr. Schonfeld did not rebut any of Dr. Kurose's testimony about the TCP/IP Socket reference, and in fact, admitted that he only had a passing knowledge of this technology. Id. at 40. As a result, SeaChange contends that the TCP/IP Sockets reference anticipates the '804 Patent. Also, SeaChange argues that three more prior art references- the IBM Video Server used by Bell Atlantic in 1993; U.S. Patent No. 5,508,732 ("'732 Patent"); and U.S. Patent No. 5,481,542 ("'542 Patent")- anticipate the asserted claims and that Dr. Kurose's testimony on this subject is unrebutted. <sup>2</sup>

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<sup>2</sup> SeaChange does not examine the remaining three prior art references in detail within the body of its brief. Rather, it

Finally, in a footnote, SeaChange contends that the asserted claims of the '804 patent are invalid for obviousness because the factual determinations underlying the obviousness inquiry are not in dispute, there is no dispute as to the scope and content of the prior art, no dispute as to the differences between the claims and the prior art, and no dispute as to the level of ordinary skill in the art. Id. at 41 n.17

In response, nCUBE contends that the record supports the jury's verdict of infringement, willfulness and the jury's finding of validity. (D.I. 157 at 41). nCube reiterates the arguments that it made in its response to SeaChange's judgment as a matter of law motion. The Court recounted nCUBE's arguments regarding infringement and willfulness in the judgment as a matter of law section of this Memorandum Opinion. Therefore, the Court will not repeat them here. In regard to validity, nCUBE first contends that Dr. Kurose, SeaChange's validity expert, failed to apply the proper standard in his analysis, because he did not consider that a patent is presumed valid and that overcoming the presumption requires clear and convincing evidence. (D.I. 157 at 35). Second, nCUBE contends that the jury correctly rejected SeaChange's argument that if the ITV

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states "[f]or the sake of brevity, we will not discuss those references in detail here. A complete analysis is found in Attachment A to this brief." (D.I. 152 at 31).

system was found to infringe, then the asserted claims must be invalid because, according to SeaChange, it simply practices the prior art, because the Federal Circuit has consistently rejected the "practicing the prior art" defense. (D.I. 157 at 35). Additionally, nCUBE argues that Dr. Kurose proceeded quickly through his validity testimony, failing to provide an element-by-element analysis, thereby failing to meet the requisite burden of clear and convincing evidence. Id. at 36. With regard to anticipation, nCUBE argues that since there was a general verdict on anticipation, that it only has to demonstrate that a reasonable jury could have found that one element of the claimed invention was absent from the prior art reference. Id. at 37.

In regard to the TCP/IP sockets reference, nCUBE contends that Dr. Kurose's testimony demonstrates that the reference does not disclose a media server and because all the claims require a media server, the jury properly found that the TCP/IP reference does not anticipate the '804 Patent. Id. In regard to the SGI reference, nCUBE argues that the SGI reference, as Dr. Schonfeld explained, lacks a connection service component because it has the same component to receive a client request for connection and to set up the connection. Id. at 37-38. Also, nCUBE contends that SeaChange failed to introduce any meaningful evidence in its brief or at trial to demonstrate that the IBM Video Server used by Bell Atlantic in 1993, the '732 Patent and the '542 Patent

anticipate the '804 Patent. Id. at 38. Specifically, nCUBE contends that SeaChange did not present any evidence that these three prior art references disclosed a connection service maintaining information to connect an appropriate service as required by claim 1, or any testimony concerning claims 4 and 10. Further, nCUBE contends that Dr. Schonfeld explained that these references do not have a connection service because they disclose a single component that receives a request for a connection and establishes that connection. Id.

In regard to obviousness, nCUBE contends that SeaChange provides no support for its blanket assertion that the '804 Patent is obvious, and therefore, it did not meet its burden of proving obviousness by clear and convincing evidence. Further, nCUBE argues that the record contains substantial evidence of objective indicia of non-obviousness- such as testimony by Dr. Schonfeld and Mr. Porter of a long-felt but unmet need in the industry for a commercially viable media server that would be compatible with different systems and testimony relating the fact that the '804 Patent solved the problem of designing a portable media server. Id. at 39.

After reviewing the evidence, the Court concludes that the jury's finding of validity of the '804 Patent is not "a miscarriage of justice" and does not "shock the conscience" so as to warrant a new trial. Additionally, the Court finds that the

verdicts of infringement and validity are consistent. In regard to invalidity the Court agrees that Dr. Kurose, SeaChange's invalidity expert, did not apply the presumption of validity when making his determinations. See Tr. at 1137:6-1139:7. Additionally, in regard to the SGI prior art reference, Dr. Schonfeld testified that the SGI reference was a single gateway architecture which lacks the connection service component of the '804 Patent, and the jury obviously credited this testimony in its finding that the SGI reference did not anticipate the '804 Patent. See Tr. at 1264:1-1267:14; 1279:20-1280:22; 1262:1-1263:24 (discussing the IBM single gateway structure and noting that the SGI reference has the same structure). The Court declines to reweigh credibility determinations and substitute its judgment for that of the jury on this issue. Further, the Court finds that the record demonstrates that SeaChange failed to introduce evidence that the SGI system has a connection service that maintains information to connect the application service as required by claim 1, nor did it present evidence that the SGI reference discloses "allocating a downstream physical address and downstream logical address" as required by claim 4, and failed to present any analysis of claims 4 and 10. Accordingly, a new trial on the ground of anticipation by the SGI reference will not be granted.

In regard to the TCP/IP socket reference, Dr. Schonfeld



testified that the reference does not show the architecture of the '804 Patent. Specifically, Dr. Schonfeld testified:

If you look at the connection table described on Friday to indicate how the socket works, one number indicates what application one computer is using, and the other number describes what application the other computer is using. In terms of architecture, what you are describing is really a point of connection between two computers. There is no component that the applications themselves are aware of. It's simply communication.

Q. Does the BSD Unix socket, does that show the architecture of the '804 patent?

A. No, it does not.

Q. Why not?

A. It does not depict an architecture other than a communication line. What is done over here is done right from the architecture from the high- from the high point, looking at it from above, looking at very different components.

This looks at how the operating system of the computer works. This is something that we're not familiar, that the application designer is not even familiar with.

Just like when you write Email, you use a windows system. Windows may have sockets for Windows standards, and you don't know that's what they do.

You don't have to worry about what they do. They're lower components that you just simply ignore.

Tr. at 1269:13-1270:18. Additionally, the Court finds that the evidence demonstrates that the TCP/IP sockets reference does not disclose a media server, as Dr. Kurose alluded to in his testimony. For instance Dr. Kurose stated that:

Q. That book you showed us, that BSD/UNIX book?

A. Yes.

Q. That doesn't talk about video servers, does it?

A. No, it doesn't.

Tr. at 1134:14-19. Because all of the asserted claims require a media server, for storing, retrieving and transporting multimedia data, the Court declines to grant a new trial based on the ground that the TCP/IP reference anticipates the '804 Patent.

In regard to the remaining prior art references, specifically, the IBM Video server used by Bell Atlantic in 1993 (Def. Ex. 531); U.S. Patent No. 5,508,732 (the "'732 Patent') (Def. Ex. 630); and U.S. Patent No. 5,481,542 (the "'542 Patent") (Def. Ex. 661), SeaChange asserts that these prior art references also anticipate the asserted claims of the '804 Patent; however, SeaChange does not discuss these references in detail in their brief. (D.I. 152 at 41). Although SeaChange asserts that a full analysis is contained in Attachment A of its brief, the Court finds that Attachment A fails to point to persuasive evidence to support its assertion. For instance, SeaChange fails to point to any testimony at trial which demonstrates that these references anticipate the asserted claims of the '804 Patent. Additionally, the Court finds that at trial SeaChange did not present any testimony to demonstrate that these references disclose a connection service maintaining information to connect an appropriate service as provided by claim 1 or any testimony concerning claims 4 and 10. Further, at trial, Dr. Schonfeld testified that the IBM reference did not have a connection service because it discloses a single component that receives a

request for a connection and establishes a connection. See Tr. at 1261:24-1263:24. Based on these facts, the Court will not grant SeaChange a new trial based on the defense that the remaining prior art references anticipate the '804 Patent.

In regard to obviousness, SeaChange asserts that the asserted claims would have been obvious to one of ordinary skill in the prior art (D.I. 152 at 41 n.17). SeaChange fails to cite any record evidence supporting its contention such as: 1) which references could be combined with other references; 2) where the motivation to combine these references comes from; or 3) even which claims would be rendered obvious by which combinations. In light of this record, the Court will not grant a new trial based on the defense of obviousness.

## **2. Whether the Jury Verdict Was Tainted By nCUBE's Conduct**

Next, SeaChange contends that it is entitled to a new trial based on nCUBE's misconduct. Specifically, SeaChange argues that nCUBE's expert testified beyond the scope of his expert report to find the "first" and "second" network in the accused ITV systems.

In response, nCUBE contends that the Court properly allowed Dr. Schonfeld to testify regarding the presence of the "first network" and "second network", given that the Court issued its claim construction during trial and during the direct examination of Dr. Schonfeld. Specifically, nCUBE argues that whether to

admit expert testimony is within the discretion of the Court and given the unique circumstances of the instant case, the Court properly allowed such testimony because: 1) the Court issued the claim construction in the middle of trial; 2) nCUBE asked for an adjournment so Dr. Schonfeld could analyze the new claim construction, to which SeaChange did not object; and 3) following the adjournment and through the end of the trial both parties' experts testified regarding the new claim construction.

The issue in this case has a unique background, and therefore, to place the issue in context, the Court will recount the pertinent events leading up to Dr. Schonfeld's testimony regarding the "first" and "second network". When the parties filed their expert reports nCUBE construed "first network" to mean "a communication path for sending information from a media server to a client." Whereas, SeaChange construed the term to mean "a unidirectional downstream network, distinct from the first network, carrying all messages from server to client." After reviewing the parties' claim construction briefs, the Court determined that neither party's proffered construction was correct, and indicated that it would not adopt either party's construction. (Tr. at 290:13-291:11; 299:24-300:5; 301:13-17). As a result, the Court did not issue a claim construction order prior to trial. Instead, the Court encouraged the parties to work towards an appropriate middle-ground construction. (Tr. at

302:2-21; 303:19-304:24).

While the trial was ongoing, the parties exchanged proposed constructions attempting to work towards a middle ground. Subsequently, during Dr. Schonfeld' direct examination, the Court issued its construction of "first network" and "second network", which was not the construction proffered by either party. Specifically, the Court defined "first network" as:

a communication path that: (a) is used for sending information from a client to a media server; (b) is distinct from the second network existing on a separate physical infrastructure; and (c) which may be either unidirectional or bidirectional

D.I. 112. Due to the Court's claim construction, nCUBE requested an adjournment so that Dr. Schonfeld could review the Court's Order. (Tr. at 506:1-507:2). After a brief recess, Dr. Schonfeld continued his direct examination, including his opinion on how the accused ITV systems met the "first" and "second network" requirement as defined by the Court. (Tr. at 585:10-18; 552:18-553:19; 555:15-23; 563:23-564:17; 575:20-576:2; 581:23-582:5; 583:18-584:5; 585:10-586:10; 588:2-12; 589:5-16.)

Rule 26 requires disclosure of an expert's opinion and the basis and reasons that support that opinion. Fed R. Civ. P. 26 (a) (2). In the instant case, both parties' expert reports and rebuttal reports were filed prior to trial on January 11, 2002 and February 1, 2002, respectively. However, the Court's claim

construction was not provided until May 22, 2002, during Dr. Schonfeld's direct testimony. Opinions of experts that are not contained in an expert's report are generally not admitted into evidence. In this case, the following circumstances support an exception: 1) the Court's claim construction on the "first" and "second" network was not issued until Dr. Schonfeld's direct testimony; 2) both experts testified based on the Court's claim construction of the "first" and "second network" (see Tr. at 1236:21-1237:12 (SeaChange's expert testifying according to the Court's claim construction on the "first" and "second" network requirements )); and 3) the expert testimony based on the Court's claim construction was helpful to the jury. Further, the Court finds that SeaChange was not unduly prejudiced by Dr. Schonfeld's testimony, and therefore, a new trial is not warranted on this ground.

Second, SeaChange argues that nCUBE's closing argument misrepresented the testimony of Dr. Jeffay about the two network limitations. Based on this, SeaChange contends that it is entitled to a new trial.

In response, nCUBE acknowledges that its counsel misspoke regarding Dr. Jaffey's testimony, but argues that this did not prejudice SeaChange and that SeaChange has waived the right to challenge the statement because they did not object to it during the closing arguments.

The Court concludes that the misstatement by nCUBE's counsel during closing argument is not a sound reason to grant a new trial because SeaChange failed to object to the statement during nCUBE's closing, and therefore, has waived the right to challenge it post-trial. See, e.g., Brenner v. Local 514, 927 F.2d 1283, 1298 (3d Cir. 1991); 2660 Woodley Road Joint Venture, et al. v. ITT Sheraton Corp., et al., No. Civ.A. 97-450-JJF, 2002 WL 53913 at \*9 (D. Del. January 10, 2002).

**V. nCUBE's Motions for a Permanent Injunction, Enhanced Damages, Attorneys Fees, Costs, Prejudgment Interest and Post-Judgment Interest**

nCUBE filed several different motions requesting various relief including a permanent injunction, enhanced damages, attorneys' fees, costs and pre and post-judgment interest.

**A. Enhanced Damages (D.I. 145, 147-1, 147-2)**

By its motions, nCUBE requests the Court to award treble damages because: 1) there was a finding of willful infringement; 2) SeaChange's misconduct during litigation and its attempts to conceal such misconduct; 3) SeaChange's failure to remedy its continuing infringement and evidence that it copied the commercial embodiment of the '804 Patent; and 4) the outcome of the case was decided in nCUBE's favor.

In response, SeaChange argues that enhanced damages should not be awarded because: 1) there is no evidence of willful

infringement; 2) this Court has complete discretion to refuse enhanced damages even if it upholds the jury's verdict; and 3) the relevant factors weigh heavily against awarding enhanced damages.

When there is a finding of willful infringement, 35 U.S.C. § 284 gives a court discretion to increase the damages up to three times the amount found. 35 U.S.C. § 284. It is well-settled that a willful infringer is exposed to enhanced damages. See Johns Hopkins Univ. v. Cellpro, Inc., 152 F.3d 1342, 1364 (Fed. Cir. 1998) (citation omitted). However, a determination of willful infringement does not mandate an enhanced penalty. Id. at 1365. Rather, the decision to award enhanced damages rests within the sound discretion of the Court.

In exercising its discretion, the Court should engage in a two-step inquiry:

First, the fact-finder must determine whether an infringer is guilty of conduct upon which increased damages may be based. If so, then the court then determines, exercising its sound discretion, whether, and to what extent, to increase the damages award given the totality of the circumstances.

Jurgens v. CBK Ltd., 80 F.3d 1566, 1570 (Fed. Cir. 1996). In performing its analysis, the Court should consider such factors as: 1) whether the infringer deliberately copied the ideas or design of another ; 2) whether the infringer, when it knew of the other's patent protection, investigated the scope of the patent



and formed a good faith belief that it was invalid or that it was not infringed; 3) the infringer's behavior as a party in the litigation; 4) the infringer's size and financial condition; 5) the closeness of the case; 6) the duration of the infringer's misconduct; 7) any remedial action by the infringer; 8) the infringer's motivation for harm; and 9) whether the infringer attempted to conceal its misconduct. Read Corp. v. Portec, Inc., 970 F.2d 816, 827 (Fed. Cir. 1992), abrogated on other grounds by, Markman v. Westview Instruments, Inc., 52 F.3d 967 (Fed. Cir. 1995). The paramount consideration is the egregiousness of the defendant's conduct based on all the facts and circumstances. See Rite-Hite Corp. v. Kelley Co., Inc., 819 F.2d 1120, 1124-26 (Fed. Cir. 1987).

Applying the standard for enhanced damages to the circumstances in this case, the Court concludes that nCUBE is entitled to have its damages award doubled. The Court is persuaded that several factors weigh in favor of an enhanced damages award in this case.

### **1. Whether SeaChange Deliberately Copied**

nCUBE argues that the jury's finding of willfulness, the public availability of design information underlying the '804 Patent together with the strong similarity between the media

server claimed in the '804 Patent and the description of the ITV system in SeaChange's engineering documentation supports a finding that SeaChange copied the invention of the '804 Patent.

In response, SeaChange argues that there was no evidence of copying presented at trial. In fact, SeaChange argues that nCUBE never proved what specific information about the OVS system was actually available to the public or that the accused system resembles the OVS system.

With regard to willfulness and copying, the jury was instructed that:

Another factor in determining whether nCUBE has proven that SeaChange willfully infringed the '804 Patent is your assessment of whether or not SeaChange copied nCUBE's product covered by the '804 Patent or whether SeaChange as a competitor of nCUBE, tried to match nCUBE's product with a functionally competitive product, but did not set identity to copy it even if - even if infringement is ultimately found.

Tr. at 1445:15-23. The jury did not find an absence of willfulness, rather the jury found there was willful infringement of the '804 Patent. The publicly available information of the underlying design information of the '804 Patent, along with the similarity of the media server described in the accused ITV systems, coupled with the jury finding of willfulness, all support the conclusion that SeaChange deliberately copied the invention of the '804 Patent. Therefore, the Court finds that this factor weighs in favor of enhanced damages.

## **2. Whether SeaChange Investigated the Scope of the Patent and Formed a Good Faith Belief That It Was Invalid or That It Was Not Infringed**

The jury necessarily rejected the argument that SeaChange, in good faith, relied on the opinion of counsel regarding the scope of the claims of the '804 Patent as discussed supra in Section III(B)(9) of this Memorandum Opinion. Also, discussed previously supra in Section III(B)(9) of this Memorandum Opinion, the Court finds that the jury's finding of willfulness is supported by substantial evidence and declines to reconsider this finding in the context of a damages evaluation.

However, this case once again presents questions that derive from unique factual circumstances. Specifically, during trial, Mr. Gerovac, SeaChange's Vice President of Research indicated that the two prior drafts of their "attorney opinion" by Mr. Larry Nixon regarding noninfringement of the ITV accused systems had been "recycled", and therefore, were not available for discovery in this case. As a result, the drafts were not offered into evidence and the jury was made aware of the fact that SeaChange had "recycled" these prior drafts. However, post-trial, SeaChange submitted declarations by Messrs. Gerovac, Nixon and Boyd. The declarations state that there were no material differences between the drafts of the Nixon opinion letter that were not retained, and that Mr. Nixon was provided with the most

up to date technical information upon which to form his opinion. (D.I. 172 at 2 n.2). On November 15, 2002, six months after trial, SeaChange filed a supplemental declaration of Mr. Gerovac, stating that he had found the two drafts in his office and attached them to his declaration for the Court's review with regard to the enhancement of damages issue.

The Court has not taken any of SeaChange's supplemental evidence into account for the purposes of examining the jury's wilfulness determination or in its analysis of SeaChange's request for a new trial, since this evidence was not before the jury. In the context of its enhancement analysis the Court will make a limited review of the newly admitted declarations. First, the Court recognizes that the Federal Circuit has stated that Read implicitly endorses the practice of using evidence not before the jury in certain circumstances "by including several factors that a jury is not in the best position to assess, such as the 'infringer's behavior as a party to the litigation' and the 'closeness of the case.'" Advanced Cardiovascular Systems v. Medtronic, Inc., 265 F.3d 1294, 1311 (Fed. Cir. 2001) (quoting Read Corp., 970 F.2d at 827). See also Amsted Indus. Inc. v. Buckeye Steel Castings Co., 24 F.3d 178, 184 (Fed. Cir. 1994) (noting that the "trial judge is in the best position to weigh considerations such as the closeness of the case, the tactics of counsel, the conduct of the parties, and any other factors that

may contribute to a fair allocation of the burdens of litigation as between winner and loser"). This Court in Lucent Techs. v. Newbridge Networks Corp., 168 F. Supp. 2d 269, 275 (D. Del. 2001), declined to consider attorney opinions in the enhancement of damages context where, the party had failed to rely on them at trial because they did not want to waive the attorney-client or work-product protection. Id. at 275. Specifically, this Court stated that:

because of Newbridge's decision not to rely on these opinions, the Court cannot evaluate whether they were from competent legal counsel or whether they expressed favorable or unfavorable opinions. As the Federal Circuit recognized, 'When an infringer refuses to produce an exculpatory opinion of counsel in response to a charge of willful infringement, an inference may be drawn that either no opinion was obtained or, if an opinion was obtained, it was unfavorable.'

Id. at 275 (quoting Electro Medical Sys., S.A. v. Cooper Life Sciences, Inc., 34 F.3d 1048, 1056-1057 (Fed. Cir. 1994)

(holding that district court was free to draw adverse inference against infringer when infringer refused to produce counsel's opinion based on attorney client privilege)).

The Court recognizes, however, that Advanced Display and Lucent are not precisely on point and that there are no Federal Circuit or Third Circuit decisions on point. The Court finds that in the interest of fairness it will accept the drafts as evidence that nCUBE did not destroy the drafts for purposes of

evaluating their conduct during litigation, but will not delve into the substantive differences between the drafts and the final opinion as evidence of nCUBE's "good faith reliance." Compare Applied Med.Res., Corp. v. United States Surgical Corp., 967 F. Supp. 861, 864 n.3 (E.D. Va. 1997) (refusing to consider opinions of counsel not produced at trial for enhancement analysis on the basis of fairness but recognizing that in certain circumstances it may be appropriate), with ALM Surgical Equip., Inc. v. Kirschner Medical Corp., C.A. No. 6:89- 1622-3, 1990 WL 123996 at \*19 (D.S.C. April 23, 1990) (considering nine opinions of counsel not produced or relied on by infringer at trial, but concluding that they supported the jury's conclusion of willful infringement). Additionally, with regard to the initial declarations of Messrs. Gerovac Nixon and Ms. Boyd, the Court will not consider them as evidence of good faith to support the contention that Mr. Nixon was provided with up to date technical information or that Mr. Nixon's drafts were substantially similar to the final draft.

The Court also finds that Mr. Nixon was not given the Connection Manager Product Specification, a crucial engineering document containing engineering information and diagrams concerning the ITV system. As a result, the Court concludes that SeaChange did not rely on Mr. Nixon's opinion in good faith because it managed the information given to him and did not share

with him the best information that was known to it.

### **3. SeaChange's Behavior as a Party in the Litigation**

In the context of considering the Read factor of SeaChange's behavior as a party to the litigation, the Court recognizes, in the context of its enhancement of damages analysis, that SeaChange did not destroy the Nixon drafts. However, the Court notes that counsel could have been more diligent in finding these drafts to present at trial.

### **4. SeaChange's Financial Condition**

The Court finds that SeaChange will not be materially impacted by an award of enhanced damages. Specifically, SeaChange's filings show that it has over \$92 million in cash holdings and its total assets are valued at over \$150 million. (D.I. 169 Ex. 12 at 3). Additionally, through two quarters of the most recent fiscal year SeaChange has generated over \$31.1 million in sales of its ITV system. As a result, the Court finds that this factor weighs in favor of enhancing damages.

### **5. The Closeness of the Case**

Apart from the judgment as a matter of law granted in favor of SeaChange for infringement based on the doctrine of equivalents due to the lack of "particularized and linking" testimony, the Court finds that the case for literal infringement was not a close one where the jury found literal infringement on

each of the asserted claims of the '804 Patent. This verdict was supported by the exhibits and expert testimony. Additionally, although SeaChange did not "recycle" the Nixon drafts, the jury's willfulness finding is supported by the fact that SeaChange managed information given to Mr. Nixon and the failure to provide him with crucial engineering documents. Further, even though nCUBE argues that this is a close case because the defense of non-infringement survived a summary judgment motion and the claim construction order did not issue until mid-trial, the Court finds these arguments unpersuasive. See Lucent Techs., 168 F. Supp. 2d 269 (awarding enhanced damages even after the claim construction order was issued at the close of evidence); 168 F. Supp. 2d at 251 (liability opinion). As a result, the Court finds that this factor weighs in favor of enhancement of damages.

## **6. Remedial Actions**

SeaChange contends that enhanced damages should not be awarded because it has taken steps to avoid infringement since the jury's determination of willfulness. However, SeaChange's understanding of this Read factor is misplaced. This Court has noted that the relevant inquiry is whether a defendant failed to discontinue its infringement "once notified of [plaintiff's] lawsuit, and its failure to discontinue its failure to take remedial action to remedy its infringement" favor enhanced damages. Lucent Techs., 168 F. Supp. 2d at 275; see also Del Mar



Avionics, Inc. v. Quinton Instrument Co., 836 F.2d 1320, 1328 (Fed. Cir. 1987) (affirming enhanced damages when defendant "continued to manufacture and sell infringing devices even after the commencement of suit.") Although SeaChange asserts that it took prompt remedial efforts after learning of the jury's infringement verdict, the Court finds that the relevant time for remedial action was when SeaChange learned of the lawsuit. The Court finds that the failure to take timely remedial action weighs in favor of enhanced damages.

#### **7. SeaChange's Motivation**

The testimony of nCUBE's CEO, Michael Pohl, demonstrates that nCUBE and SeaChange are direct competitors in the video-on demand industry. (Tr. at 179:18-180:6). Additionally, Mr. Pohl's testimony indicates that the industry is a highly competitive market and predicts consolidation of that market within the next few years. (Tr. at 176:820; 179:18-180:19). Accordingly, the Court finds that this factor also militates in favor of enhanced damages.

Based on the jury's findings of willful infringement and in light of the aggravating factors weighing in favor of enhanced damages in this case, the Court concludes that nCUBE is entitled to an award of enhanced damages. Accordingly, nCUBE's Motion For Enhanced Damages will be granted.

## **B. Attorneys' Fees and Costs (D.I. 145, 147)**

By its Motion, nCUBE requests the Court to award attorneys' fees and costs to nCUBE as the prevailing party. Specifically, nCUBE contends that this case is exceptional, based on the jury's verdict of willful infringement on the patent-in-suit and the presence of several aggravating factors similar to those considered in the context of the enhanced damages issue.

In response, SeaChange contends that the Court should not award the attorneys' fees because the case at bar is not exceptional where nCUBE has failed to prove willfulness or litigation misconduct by clear and convincing evidence. Moreover, SeaChange argues that this case was a close one in which this Court declined to award summary judgment and in which the claims were not construed until trial. Additionally, SeaChange argues that this Court should deny attorneys' fees because nCUBE has failed to properly justify the amount of fees that it has requested. Specifically, SeaChange argues that nCUBE's documentation is broken down by individual and month, with no correlation of particular time spent on particular tasks. As a result, SeaChange argues that this lack of detailed documentation makes it impossible to determine the reasonableness of any time expended on any particular task.

### **1. Legal Standard For Award Of Attorneys' Fees**

Section 285 authorizes the Court "in exceptional cases" to

award "reasonable attorney fees to the prevailing party."  
Willful infringement alone is sufficient to justify a finding that a case is exceptional. 35 U.S.C. § 285; see also Mahurkar v. C.R. Bard, Inc., 79 F.3d 1572, 1580 (Fed. Cir. 1996); S.C. Johnson & Son, Inc. v. CarterWallace, Inc., 781 F.2d 198, 200 (Fed. Cir. 1986). In addition, the Court may consider the factors relevant to an enhanced damages award in determining whether attorneys' fees should be granted. See Donald S. Chisum, Chisum on Patents, § 20.03[4][c][ii] (1999). The decision to award attorneys' fees is within the discretion of the Court. See, e.g., J.P. Stevens Co. v. Lex Tex Ltd., 822 F.2d 1047, 1050 (Fed. Cir. 1987).

## **2. Whether nCUBE Is Entitled To Attorneys' Fees and Costs**

Based on the jury's finding of willfulness and the factors discussed in the context of the Court's enhanced damages determination, the Court concludes that the instant case is exceptional, such that nCUBE is entitled to an award of reasonable attorneys' fees and costs. In particular, the Court finds SeaChange's failure to investigate the patent and/or rely on the informed opinions of competent counsel before engaging in and/or continuing its infringing activity to be highly relevant evidence on the attorneys' fees issue. See, e.g., Gillette Co. v. S.C. Johnson & Son, Inc., 1990 U.S. Dist. Lexis 3395, 15 U.S.P.Q. 2D (BNA) 1795, 1799 (D. Mass.) (stating that "[i]n a case in

which an infringer does not act 'prudently' and 'reasonably' before engaging in infringing action, it is only 'fair' to allocate to the infringer the costs which the patent holder has to incur in order to seek redress."), aff'd, 919 F.2d 720 (Fed. Cir. 1990). However, consistent with the Court's award of double, rather than treble enhanced damages, and given the fact that the Court overturned the jury's verdict of infringement under the doctrine of equivalents, the Court will not award nCUBE its full attorneys' fees. Rather, the Court will award nCUBE two-thirds of the attorneys' fees and costs it has requested. Accordingly, nCUBE's Motion For Attorneys' Fees will be granted as indicated.

#### **C. Prejudgment and Post-Judgment Interest (D.I. 147)**

By its motion, nCUBE seeks both pre and post-judgment interest. In patent cases, the United States Supreme Court has stated that the award of prejudgment interest reflects the Patent Act's provision of complete compensation for the patent owner. General Motors Corp. v. Devex Corp., 461 U.S. 648, 657 (1983). As a result, prejudgment interest in patent cases should ordinarily be awarded absent some justification for withholding such an award. Id. at 657. In the instant case, nCUBE seeks prejudgment interest on its reasonable royalty damages award. The Court will grant nCUBE's motion for prejudgment interest on the reasonable royalty award in the amount of \$62,101, which the

parties do not dispute. See D.I. 169 (stating that the parties do not dispute the pre-judgment interest award).

nCUBE also seeks post-judgment interest pursuant to 28 U.S.C. § 1961, which states that "interest shall be allowed on any money judgment in a civil case recovered in a district court." The Court will also grant nCUBE's motion for post-judgment interest. In its motion nCUBE seeks \$5,829 of post-judgment interest; however it indicates that the post-judgment amount will be updated when the total amount of damages is determined. Therefore, nCUBE shall submit an updated post-judgment calculation based on the damages award within twenty (20) days after receipt of this Memorandum Opinion. SeaChange shall file objections twenty (20) days after receipt of nCUBE's updated post-judgment calculation.

#### **D. Permanent Injunction and An Accounting (D.I. 138)**

nCUBE seeks a permanent injunction enjoining SeaChange from infringing the '804 Patent in addition to an accounting. Pursuant to 35 U.S.C. § 283, the Court is authorized to "grant injunctions in accordance with the principles of equity to prevent the violation of any right secured by a patent, on such terms as the court deems reasonable." 35 U.S.C. § 283. A Court is not required to enter an injunction when infringement has been determined. See, e.g., W.L. Gore & Assocs., Inc. v. Garlock,

Inc., 842 F.2d 1275, 1281 (Fed. Cir. 1988). Rather, a Court has broad discretion in deciding whether to grant an injunction and in determining its scope. See Joy Techs. Inc. v. Flakt, Inc., 6 F.3d 770, 772 (Fed. Cir. 1993). However, as a general rule, "an injunction will issue when infringement has been adjudged absent a sound reason for denying it." Richardson v. Suzuki Motor Co., Ltd., 868 F.2d 1226, 1247 (Fed. Cir. 1989). In the instant case, the Court finds that there are sound reasons for denying a permanent injunction and an accounting at this time. The Court has granted SeaChange's Motion for Judgment as a Matter of Law with regard to infringement under the doctrine of equivalents and there is a second lawsuit between the parties. The parties have indicated that they intend to appeal both cases. The parties have also indicated that they will withdraw their respective motions for permanent injunctions in the two cases with leave to re-file these motions following resolution of the appeals. As a result, the Court will deny the motion for a permanent injunction and an accounting, with leave to renew after the completion of the appeals.

**VI. Plaintiff's Motion to Strike and Disregard the Untimely Declarations of Messrs. Gerovac, Nixon and Ms. Boyd as outside the Record Evidence and submitted for an Improper Purpose (D.I. 170).**

The Court concludes that Plaintiff's Motion to Strike and Disregard the Untimely Declarations of Messrs. Gerovac, Nixon and Ms. Boyd as outside the Record Evidence and Submitted for an

Improper Purpose (D.I. 170) will be granted in part and denied in part. Specifically, the Court will consider the supplemental declaration of Mr. Gerovac, which includes the newly found drafts (D.I. 175), as explained in supra Section V.(A)(2) of this Memorandum Opinion. In the interests of fairness for the limited purpose indicated, the Court will disregard the substantive content of the drafts. The Court will disregard the initial Declarations of Mr. Nixon, Ms. Boyd and Mr. Gerovac which state that there are no material differences between the Nixon drafts and the final opinion and that Mr. Nixon was provided with the most up to date information, as untimely.

An appropriate Order has been entered. (D.I. 182).

IN THE UNITED STATES DISTRICT COURT  
FOR THE DISTRICT OF DELAWARE

NCUBE CORPORATION, :  
 :  
Plaintiff, :  
 :  
v. : Civil Action No. 01-11-JJF  
 :  
SEACHANGE INTERNATIONAL, INC.:  
 :  
Defendant. :

**ORDER**

NOW THEREFORE, for the reasons stated set forth in the Memorandum Opinion issued this date, IT IS HEREBY ORDERED this 31st day of March 2003 that:

(1) SeaChange's Motion for Judgment as a Matter of Law is **GRANTED** in part and **DENIED** in part (D.I. 146-1);

(2) Plaintiff's Motion for a New Trial in the Alternative is **DENIED** (D.I. 146-2);

(3) nCUBE's Motion for a Permanent Injunction and an Accounting (D.I. 138) is **DENIED**;

(4) Plaintiff's Motions for Enhanced Damages, Attorneys Fees Attorneys Fees, Costs, Prejudgment Interest and Post-Judgment Interest (D.I. 145, 147-1, 147-2) are **GRANTED**;

(a) nCUBE is awarded Enhanced Damages of \$4,071,658 (2



x 2,035,829.00)

(b) nCUBE is awarded Prejudgment Interest of \$62,101

(c) nCUBE is awarded 2/3 of attorneys fees and costs in the amount of \$1,839,852.30;

(d) In regard to Post-Judgment Interest, nCUBE shall submit an updated post-judgment calculation based on the damages award in this opinion within five (5) days after receipt of this Memorandum Opinion. SeaChange will have five (5) days after receipt of nCUBE's updated post-judgment calculation to object to this amount.

(5) Plaintiffs' Motion to Strike and Disregard the Untimely Declarations of Messrs. Gerovac, Nixon and Ms. Boyd as outside the Record Evidence and submitted for an Improper Purpose (D.I. 170) is GRANTED in part and DENIED in part.

\_\_\_\_\_  
JOSEPH J. FARNAN, JR.  
UNITED STATES DISTRICT JUDGE

IN THE UNITED STATES DISTRICT COURT  
FOR THE DISTRICT OF DELAWARE

NCUBE CORPORATION, :  
 :  
 Plaintiff, :  
 :  
 v. : Civil Action No. 01-11-JJF  
 :  
 SEACHANGE INTERNATIONAL, INC. :  
 :  
 Defendant. :

**O R D E R**

WHEREAS, the Court issued an Order dated March 31, 2003  
(D.I. 182) regarding the Memorandum Opinion issued this date;

WHEREAS, to remain consistent with the Memorandum  
Opinion issued this date;

IT IS HEREBY ORDERED that paragraph "d" of the March  
31, 2003 Order is amended to read as follows:

(d) In regard to Post-Judgment Interest, nCUBE shall  
submit an updated post-judgment calculation based on the damages  
awarded within **twenty (20) days** after receipt of this Memorandum  
Opinion. SeaChange shall file objections **twenty (20) days** after  
receipt of nCUBE's updated post-judgment calculation.

April 7, 2004  
DATE

JOSEPH J. FARNAN, JR.  
UNITED STATES DISTRICT JUDGE